Since January 2020 Elsevier has created a COVID-19 resource centre with free information in English and Mandarin on the novel coronavirus COVID-19. The COVID-19 resource centre is hosted on Elsevier Connect, the company's public news and information website.

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Can glycopyrrolate come to the airway rescue in Covid-19 patients?

Corona virus disease 2019 (COVID-19), as named by World Health Organisation (WHO), has emerged as one of the biggest threats to mankind. Due to rapid spread among health care workers (HCW), management of airway has become a colossal task for the HCWs. Not only adequate personal protective equipment (PPE) is necessary, additional measures are being instituted to secure the airway whilst minimising the aerosol generation and transmission.

Use of disposable single use equipments has been advocated for securing the airway. At the same time, video laryngoscopes (VL) have been proposed to be used as the first line device for securing the airway due to its ability to maintain an adequate distance from the patient and also providing assistance in difficult airways [1,2]. Also, prolonged preoxygenation with rapid sequence induction (RSI) with use of neuromuscular blockers (NMB) has been recommended to minimise the coughing and aerosol generation in these patients [3]. Suctioning of the secretions also carries an inherent risk of aerosolization of the viral particles [4].

The use of glycopyrrolate in these patients is something to ponder about in such a scenario. Glycopyrrolate has been used as premedication as an anti-sialagogue, hence aiding in better visualisation of the airway [5]. Moreover, glycopyrrolate induced tachycardia and hypertension can be beneficial in hemodynamically unstable and critically ill COVID-19 patients. Cho et al. used glycopyrrolate for aiding in rigid video-stylet intubation in a randomised control study and found that glycopyrrolate facilitated tracheal intubation by decreasing oral secretions and providing better visualisation and faster intubation with hemodynamic stability [6]. Intravenous dose of glycopyrrolate (4–6 μg/kg) 2–3 min before intubation will provide rapid onset of action. However, caution needs to be maintained in pre-existing cardiac comorbidities as glycopyrrolate can precipitate tachyarrhythmias [5].

Therefore, we would like to conclude that glycopyrrolate may be used as an adjunct to intubation for suspected or confirmed COVID-19 patients to facilitate visualisation and minimise suctioning, if no contraindication for its administration exists. Further studies are needed to make a standard guideline for the same.

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